ABSTRACT

A gas control valve is provided for a gas appliance that includes an electrical cut-off (ECO) switch, and a thermocouple having an electrical terminal. The gas control valve includes a control valve housing having a bore therein, an automatic pilot valve magnet disposed the bore and having an electrical terminal, and a connector apparatus for connecting the ECO switch in a series circuit relationship between the electrical terminals of the thermocouple and the pilot valve magnet. The connector apparatus includes a spacer abutting the pilot valve magnet in the bore, a connector for engaging the spacer through a window in the control valve housing and connecting the ECO switch to electrical terminals of the thermocouple and pilot valve magnet, and a retainer for clamping the spacer against the pilot valve magnet and receiving the thermocouple.